

Scaled data based on original data using
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State
Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: FAIL-SAFE

Report Number: P312025

Luminaire Tested: **14FCZ2-25-UNV-L83050-RDP-CP125-W2A-U-3000K**

Issue Date: 3/3/2020

This test was performed under the Supervised Manufacturer's Testing Program. The results of this test have not been influenced by sources from within Cooper Lighting Solutions or from external interests.

Test Information

Test Method: LM-79-08
Report Number: P312025
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1805-783-43)
Test Lab: INNOVATION CENTER(G3)
Issue Date: 3/3/2020
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)
Product Line: FAIL-SAFE
Catalog Number: 14FCZ2-25-UNV-L83050-RDP-CP125-W2A-U-3000K
Description: 1'X4' TROFFER LED MODULE, SMOOTH LENS WITH INSERT , 0.125" POLYCARB SHEET
Light Source: (168) 3000K TUNABLE CCT, 80 CRI LEDS
Ballast/Driver: ELECTRONIC DRIVER
Luminaire Equipment:

<u>Sample No.</u>	<u>Condition</u>	<u>Description</u>
AS-5443-1	Good	WHITE TWIN R-EVOLVE FLOOD
AS-5443-2	Good	REFLECTOR
AS-5443-3	Good	DRIVER
AS-5443-4	Good	UPPER MODULE
AS-5443-5	Good	LENS
AS-5443-6	Good	DRIVER 2
AS-5443-7	Good	TRIM RING

Summary

Lumens per Lamp: N/A
Luminaire Lumens: 1389.0 lumens
Efficiency: N/A
Efficacy: 70.9 lumens/watt
Spacing Criteria (0/90/45): 1.25 / 1.29 / 1.4
Luminous Opening: Rectangular (W 1' x L: 4' x H: 0')
CIE Type: Direct

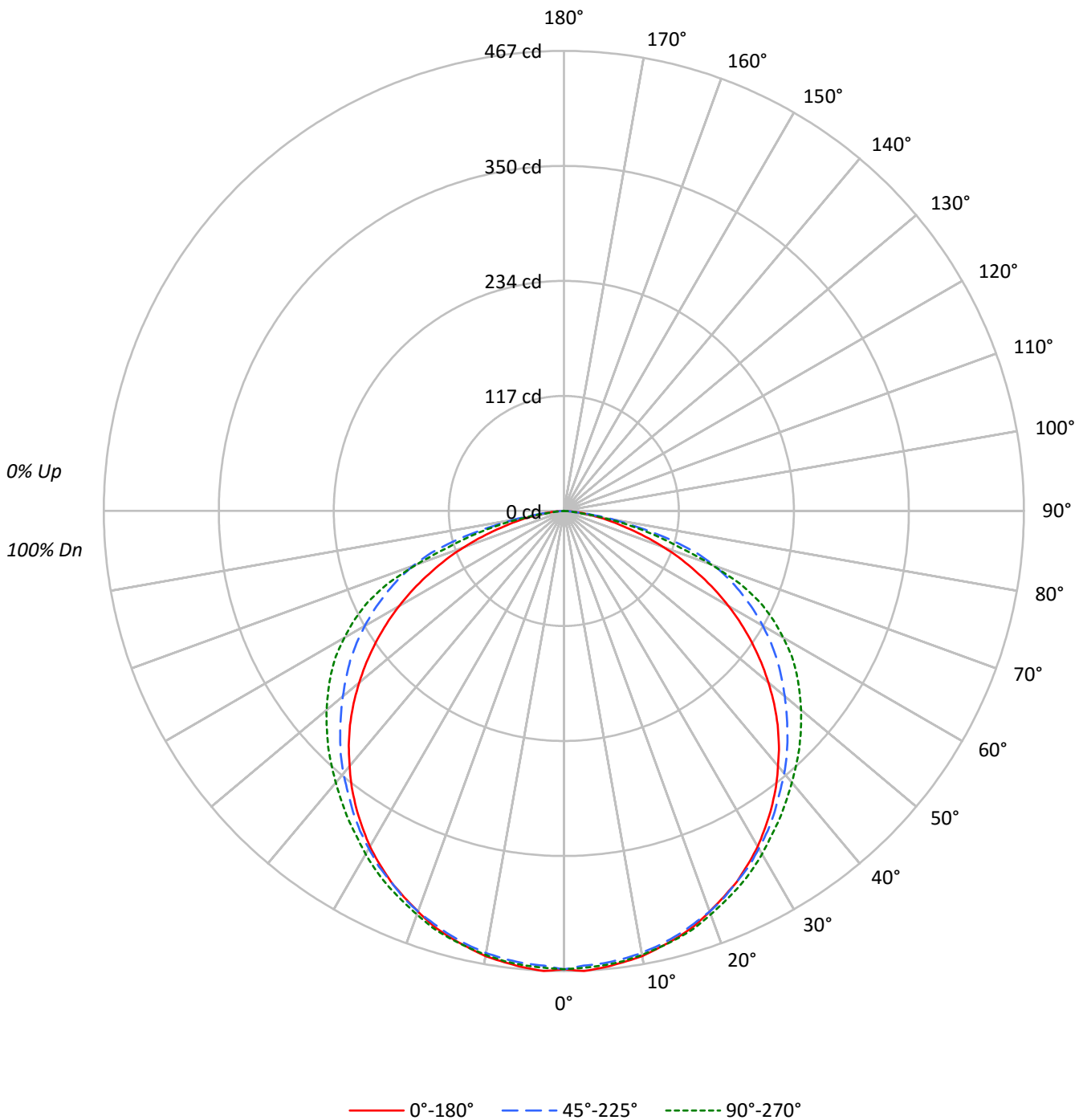
Input Watts (W): 19.6
Input Voltage (V): NR
Input Current (A_{in}): NR
Voltage Rise (V): NR
Power Factor: NR
Total Harmonic Distortion (THDi): NR
Frequency (hertz): 60
Stabilization Time: NR
Operation Time: NR
Ambient Temperature (°C): NR
Test Distance: 25 FT



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Luminous Intensity Polar Plot





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COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:

RF	20				20				20				20				20	
RC	80				70				50				30				10	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	119	119	119	119	116	116	116	116	111	111	111	106	106	106	102	102	102	100
1	109	104	100	96	106	102	98	94	97	94	91	93	91	88	90	88	86	84
2	99	90	83	77	96	88	82	76	85	79	75	81	77	73	78	75	71	69
3	90	79	71	64	87	77	70	63	74	68	62	71	66	61	69	64	60	58
4	82	70	61	54	80	68	60	53	66	58	53	63	57	52	61	56	51	49
5	75	62	53	46	73	61	52	46	59	51	45	57	50	45	55	49	44	42
6	69	56	47	40	67	55	46	40	53	45	40	51	44	39	50	44	39	37
7	64	50	42	35	62	50	41	35	48	40	35	47	40	35	45	39	34	32
8	60	46	37	31	58	45	37	31	44	36	31	43	36	31	41	35	31	29
9	56	42	34	28	54	42	34	28	40	33	28	39	33	28	38	32	28	26
10	52	39	31	25	51	38	31	25	37	30	25	36	30	25	35	29	25	23

AVERAGE LUMINANCE (cd/sqm):

	0°	45°	90°
0°	1252	1252	1252
5°	1257	1245	1251
10°	1253	1245	1250
15°	1248	1242	1251
20°	1239	1239	1248
25°	1233	1233	1249
30°	1223	1230	1250
35°	1208	1225	1254
40°	1188	1223	1265
45°	1168	1222	1287
50°	1135	1226	1317
55°	1094	1241	1354
60°	1039	1255	1383
65°	960	1270	1401
70°	853	1280	1254
75°	687	1150	1003
80°	538	807	656
85°	367	235	167



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ZONAL LUMENS:

Zone	Lumens	% Fixture
0°-10°	44.0	3.2
10°-20°	126.3	9.1
20°-30°	192.4	13.8
30°-40°	234.3	16.9
40°-50°	248.6	17.9
50°-60°	234.6	16.9
60°-70°	189.4	13.6
70°-80°	102.8	7.4
80°-90°	16.6	1.2
90°-100°	0.0	0.0
100°-110°	0.0	0.0
110°-120°	0.0	0.0
120°-130°	0.0	0.0
130°-140°	0.0	0.0
140°-150°	0.0	0.0
150°-160°	0.0	0.0
160°-170°	0.0	0.0
170°-180°	0.0	0.0
0°-30°	362.7	26.1
0°-40°	597.0	43.0
0°-60°	1080.2	77.8
0°-90°	1389.0	100.0
90°-120°	0.0	0.0
90°-150°	0.0	0.0
90°-180°	0.0	0.0
0°-180°	1389.0	100.0

CANDELA DISTRIBUTION:

	0°	22.5°	45°	67.5°	90°	Flux
0°	465	465	465	465	465	
5°	465	464	461	464	463	44
15°	448	447	446	449	449	126
25°	415	414	415	420	421	191
35°	368	370	373	381	382	230
45°	307	311	321	333	338	236
55°	233	243	265	282	288	208
65°	151	169	200	216	220	149
75°	66	96	111	100	96	72
85°	12	13	8	6	5	15
90°	0	0	0	0	0	



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CANDELA DISTRIBUTION (FULL):

	0°	22.5°	45°	67.5°	90°
0°	465.2	465.2	465.2	465.2	465.2
2.5°	467.4	465.2	462.0	465.2	464.1
5°	465.2	464.1	460.9	464.1	463.0
7.5°	462.0	462.0	458.7	460.9	460.9
10°	458.7	457.6	455.5	458.7	457.6
12.5°	453.3	452.2	451.1	454.4	453.3
15°	447.9	446.8	445.7	448.9	448.9
17.5°	441.4	440.3	439.2	443.5	443.5
20°	432.7	432.7	432.7	437.0	435.9
22.5°	424.0	424.0	425.1	429.4	428.3
25°	415.3	414.2	415.3	419.7	420.8
27.5°	404.5	405.6	406.7	411.0	412.1
30°	393.6	394.7	395.8	401.2	402.3
32.5°	380.6	382.8	385.0	391.5	391.5
35°	367.6	369.8	373.0	380.6	381.7
37.5°	353.5	355.7	360.0	368.7	370.9
40°	338.3	341.6	348.1	356.8	360.0
42.5°	323.2	327.5	335.1	344.8	349.2
45°	306.9	311.2	321.0	332.9	338.3
47.5°	289.5	295.0	306.9	322.1	326.4
50°	271.1	278.7	292.8	309.1	314.5
52.5°	252.7	261.3	278.7	296.0	301.5
55°	233.1	242.9	264.6	281.9	288.5
57.5°	213.6	224.5	249.4	267.8	274.4
60°	193.0	206.0	233.1	251.6	257.0
62.5°	172.4	187.6	216.9	235.3	239.7
65°	150.7	169.2	199.5	215.8	220.1
67.5°	130.1	151.8	182.2	194.1	194.1
70°	108.4	132.3	162.7	165.9	159.4
72.5°	86.8	113.9	141.0	129.0	123.6
75°	66.1	96.5	110.6	99.8	96.5
77.5°	49.9	78.1	78.1	71.6	69.4
80°	34.7	59.6	52.1	45.5	42.3
82.5°	22.8	33.6	27.1	21.7	18.4
85°	11.9	13.0	7.6	6.5	5.4
87.5°	4.3	2.2	1.1	2.2	1.1
90°	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)